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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
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10/820,331

04/08/2004

Harald Schmitzer

DT-6788

8547

30377

7590

08/27/2007

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EXAMINER

LOPEZ, MICHELLE

ART UNIT

PAPER NUMBER

3721

MAIL DATE

DELIVERY MODE

08/27/2007

PAPER

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

Office Action Summary

Application No.

10/820,331

Applicant(s)

SCHMITZER ET AL.

Examiner

Michelle Lopez

Art Unit

3721

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 23 March 2007.
- 2a) ☐ This action is FINAL. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-14 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1-14 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on _____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. _____.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- 1) ☐ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☐ Information Disclosure Statement(s) (PTO/SB/08)
Paper No(s)/Mail Date _____.
- 4) ☐ Interview Summary (PTO-413)
Paper No(s)/Mail Date. _____.
- 5) ☐ Notice of Informal Patent Application
- 6) ☐ Other: _____.

DETAILED ACTION***Continued Examination Under 37 CFR 1.114***

A request for continued examination under 37 CFR 1.114, including the fee set forth in 37 CFR 1.17(e), was filed in this application after final rejection. Since this application is eligible for continued examination under 37 CFR 1.114, and the fee set forth in 37 CFR 1.17(e) has been timely paid, the finality of the previous Office action has been withdrawn pursuant to 37 CFR 1.114. Applicant's submission filed on 3/23/07 has been entered.

Claim Rejections - 35 USC § 103

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

Claims 1 and 3-5 are rejected under 35 U.S.C. 103(a) as being obvious over Mayr EP1393864 in view of Bongers-Ambrosius et al. 6,520,266.

Mayr discloses a hand-held electric machine tool with an at least partly rotary-driven tool receptacle for a tool and a press switch arranged at a handle on a workpiece side for activating a connection of a power source 9 to an electric motor 1 connected to control electronics 7 that are connected to a sensor 6, wherein the sensor is arranged between the tool receptacle 5 and the handle, but does not disclose wherein said sensor is a force sensor that measures an axial pressing force of the hand-held electric machine tool pressing against a workpiece. However, Bongers-Ambrosius teaches the concept of a hand held electric machine tool comprising a force sensor 12 which measures an axial pressing force of the machine tool against a workpiece and a

Art Unit: 3721

control unit for the purpose of controlling the operation of the machine tool in accordance with said measured axial force as shown in col. 3, lines 5-19. It would have been obvious to one having ordinary skill in the art to have substituted Mayr's sensor for the force sensor of Bongers-Ambrosius in order to adjust the operation of the machine tool in accordance with a measured axial force.

With respect to claim 3, Mayr also discloses wherein the control electronics 7 are controllably connected to a mode selector switch 8.

With respect to claim 4, while Mayr teaches an axially movable hammer element via a percussion mechanism not shown numerically, Mayr does not disclose wherein said hammer element is axially displaceable with respect to the tool receptacle by a maximum of 1mm. However, it would have been obvious to one having ordinary skill in the art at the time the invention was made to provide such axial displacement as claimed, since it has been held that where the general conditions of a claim are disclosed in the prior art, discovering the optimum or workable range involves only routine skill in the art.

With respect to claim 5, Mayr discloses a control process for a hand-held tool capable of operating in a selected operating mode via 8 wherein a control of the hand-held tool is activated in a first step by actuating a press switch, i.e. a trigger, and in a second step the control controls an electric motor 1 depending on a sensed measurement by sensor 6, but does not disclose wherein said sensor is a force sensor and said motor is controlled depending on a sensed force related to an axial pressing force of the tool against a workpiece. However, Bongers-Ambrosius teaches the concept of a hand held electric machine tool comprising a force sensor 12 which measures an axial pressing force of the machine tool against a workpiece, a motor, and a control

Art Unit: 3721

unit for the purpose of controlling the operation of the motor in accordance with the measured axial force as shown in col. 3, lines 5-19. It would have been obvious to one having ordinary skill in the art to have substituted Mayr's sensor for the force sensor of Bongers-Ambrosius in order to control the operation of the motor in accordance with a measured axial force.

Claims 2 and 6-14 are rejected under 35 U.S.C. 103(a) as being obvious over Mayr EP1393864 in view of Bongers-Ambrosius et al. 6,520,266, and further in view of Gilmore 6,836,614.

Mayr as modified by Bongers-Ambrosius discloses the invention as described above including a press switch, but does not disclose wherein said press switch is a potentiometer having discrete switching states. However, Gilmore teaches the concept of an electrical power tool having a switch as a potentiometer 14,15 having discrete switching states for the purpose of controlling an output torque of said tool in discrete incremental amounts. It would have been obvious to one having ordinary skill in the art to have provide Mayr's invention as modified by Bongers-Ambrosius and further having a potentiometer as taught by Gilmore in order to control an output torque of the tool in discrete incremental amounts.

With respect to claims 6 and 8-10, it is deemed that Gilmore provides a time dependant control wherein after an activation period it is capable of controls an electric motor as a control function increasing progressively with respect to time as shown in col. 2, lines 34-40 (claim 6); wherein the control controls the motor independent from an amount of a sensed measurement by a sensor rather dependent of an operator input as shown in col. 2, lines 40-45 (claims 8 and 10); wherein the control of the tool is deactivated when the trigger is released as shown in col. 13, lines 34-36 (claim 9).

Art Unit: 3721

With respect to claim 7, Mayr discloses wherein the control always controls the motor above a minimum rotational speed which is dependant upon the selected operating mode selected as shown in col. 1, lines 54-63 as shown in col. 2, lines 40-50.

As far as claims 11-13 were understood, while Gilmore teaches the concept of a control circuit for controlling operation of an electric motor of a power tool depending on a time period of a trigger actuation and release of the trigger as shown in col. 13, lines 10-36, Gilmore does not disclose wherein said control is performed by activation and deactivation of said trigger within a period less than 0.5 s. and wherein the control is deactivated by a repeated triggering actuation of the trigger over a time period of a maximum of 0.5 s. However, it would have been obvious to one having ordinary skill in the art at the time the invention was made to provide such period of time as claimed, since it has been held that where the general conditions of a claim are disclosed in the prior art, discovering the optimum or workable range involves only routine skill in the art.

With respect to claims 13-14, Bongers-Ambrosius teaches the concept of activation and deactivation of the control at a force peak as claimed as shown in col. 2, lines 41-67 and col. 3, lines 1-19.

Response to Arguments

Applicant's arguments have been considered but are moot in view of the new ground(s) of rejection.

Conclusion

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Michelle Lopez whose telephone number is 571-272-4464. The examiner can normally be reached on Monday - Thursday: 8:00 am - 6:00 pm.

Art Unit: 3721

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Rinaldi Rada can be reached on 571-272-4467. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

/ML/
Patent Examiner



Rinaldi I. Rada
Supervisory Patent Examiner
Group 3700